



Aerial Detection Survey, Pacific Southwest Region Northern Interior, March 2019

Objective: The objective of this survey is to detect and record recently dead and currently damaged trees, mostly caused by insects and diseases. Mortality from fire is not generally recorded.

Surveyors: J. Moore, L. McAfee, J. Pope

Methodology: Recent tree mortality is visually surveyed and documented using Digital Mobile Sketch Mapping (DMSM) systems. Surveyors draw polygons or affix points and annotate estimated percent of forest area affected along with damage type, tree species, and causal agent. The five-class rating system is: Very Light (1-3%), Light (4-10%), Moderate (11-30%), Severe (31-50%), and Very Severe (>50%).

Survey Highlights:

This report summarizes preliminary findings in and around the Shasta-Trinity and Klamath National Forests, the area surrounding Lake Britton on the Lassen National Forest, Whiskeytown National Recreation Area, and neighboring forested lands of various ownerships.

- California red fir, white fir and, to a lesser extent Douglas-fir mortality, collectively predominated and was somewhat concentrated in eastern and southern areas of the Shasta Trinity NF.
- Ponderosa and Jeffrey pine mortality was also scattered with two concentrations of clustered mortality on the Shasta Trinity National Forest south of Hayfork and along the eastern edge of the Forest with another active area along Buckhorn Ridge (Oak Knoll RD, Klamath NF).
- Other tree species affected include knobcone pine, widely scattered sugar pine, and pockets of tanoak in western areas.
- Significant areas around Redding were not surveyed due to several large wildfires.
- Most of the western Klamath and Shasta Trinity National Forests as well eastern portions of the Six Rivers NF were also not surveyed.

Tree Species Affected	Acres with Mortality
White fir	81,594
California red fir	35,914
Ponderosa pine	21,197
Douglas-fir	8,753
Jeffrey pine	1,208
Other tree species	640
Total	149,306

Preliminary Summary

Area surveyed: 3.9 million acres

Acres with mortality: 149,306 acres

(numbers may change)



Recent ponderosa pine mortality mixed with older tree mortality east of McCloud (Shasta-Trinity NF).



Scattered white fir mortality near the boundary of Shasta-Trinity National Forest west of Shasta Lake.







